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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/706,432

11/12/2003

John Gregory Klinecicz

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09/14/2004

AT&T CORP.

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EXAMINER

NGUYEN, VAN KIM T

ART UNIT

PAPER NUMBER

2661

DATE MAILED: 09/14/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/706,432

Applicant(s)

KLINCEWICZ ET AL.

Examiner

Van Kim T. Nguyen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 November 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-7 and 12-15 is/are rejected.
- 7) ☒ Claim(s) 9-11 and 16-19 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

This Office Action is responsive to communications filed on November 12, 2003.

Double Patenting

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1-3, 5, and 12-15 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1 and 3 of U.S. Patent No. 6,697,334.

Claims 1 and 3 of U.S. Patent '334 discloses all the limitations as recited in claims 1 and 12 of the instant application, plus an additional requirement, i.e., the allocated maximum delay of each link in the network topology satisfying the delay limits on node-to-node communication.

As it is well known in the art, a link capacity is computed based on specified demands, delays, scheduling/buffering scheme and congestion options, thus it is inherent that a maximum delay can be allocated to each link in the network topology without concerning about the delay limit on node-to-node communication, as long as it meets users' requirements.

Additionally, claims 1 and 3 of U.S. Patent '334 disclose all limitations as recited by claims 2-3 and 13-14 of the instant application.

Similarly, claims 2 and 4 of U.S. Patent '334 disclose all limitations as recited by claims 5 and 15 of the instant application.

Double Patenting

Claims 4, 6-7 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1 and 3 of U.S. Patent No. 6,697,334 as applied to claims 1 and 12 of the instant application above, in view of Benmohamed et al (US 6,240,463).

Claims 1 and 3 of U.S. Patent '334 disclose all limitations as recited by claim 4, except repeating all of the steps until the network design ceases to change.

Regarding claim 4, as shown in Figures 1-11, Benmohamed teaches computing link capacity requirements and optimizing network topology by repeating the steps until the final design is achieved (steps 202, 204, 206; col. 5: lines 10-32).

Regarding claims 6-7, Benmohamed also teaches systematically examining the network topology to determine if at least one of eliminating or adding any given link would reduce a cost of the network (steps 616, 618, 620; col. 15: lines 20-45).

Since it is highly desirable to obtain the optimize network topology, it would have been obvious to one of ordinary skill in the art at the time the invention was made to utilize

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Benmohamed's method of designing network with performance guarantee to U.S. Patent' 334, motivated by the need to improve network performance and reduce overall network costs.

Allowable Subject Matter

Claims 8-11 and 16-19 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is an examiner's statement of reasons for allowance:

Claims are considered allowable when reading the claims none of the references of record singly or in combination disclose or suggest the combination limitations specified in the dependent claims including determining the sizing of bandwidth by assigning virtual channels to each of the plurality of traffic classes, with the bandwidth of each virtual channel being sized separately and wherein the total bandwidth is based on the sum of the bandwidth of the virtual channels as well as on a maximum utilization factors for the links; or determining the link length based on the marginal cost of the link with respect to the total traffic that is routed on it by taking the product of a marginal cost of the bandwidth with respect to current bandwidth required and a marginal link bandwidth required with respect to traffic routed on the link.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

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Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:


Natarajan et al (US 6,769,024); Erimli et al (US 6,745,246); Chiu et al (US 6,744,767); Wang et al (US 6,724,722); Goyal (US 6,711,607); Doshi et al (US 6,529,499); Ramfelt et al (US 6,510,141); Iwata (US 6,385,201); Benmohamed et al (US 6,240,463); and Gawlick et al (US 6,175,870).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Van Kim T. Nguyen whose telephone number is 571-272-3073. The examiner can normally be reached on 8:00 AM - 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kenneth Vanderpuye can be reached on 571-272-3078. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

vkx


KENNETH VANDERPUYE
PRIMARY EXAMINER